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| APPLICATION NO.                | FILING DATE   | FIRST NAMED INVENTOR     | . ATTORNEY DOCKET NO. | CONFIRMATION NO. |  |  |
|--------------------------------|---------------|--------------------------|-----------------------|------------------|--|--|
| 10/635,679 08/07/2003          |               | Edward Alan Higginbotham | 3485                  |                  |  |  |
| 75                             | 90 09/22/2004 |                          | EXAMINER              |                  |  |  |
| Edward A. Higginbotham         |               |                          | SLACK, NAOKO N        |                  |  |  |
| 247 Father Judg<br>Amherst, VA |               |                          | ART UNIT              | PAPER NUMBER     |  |  |
| immetst, vit                   |               |                          | 3635                  | 3635             |  |  |

DATE MAILED: 09/22/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

|   |  | Applicat   | ion No  | Applicant(s)  |              |  |  |
|---|--|--|---|---|--------------|--|--|
|   |  |  |   |   | 9            |  |  |
| Office Action Summany                         |  | 10/635,6   |   | HIGGINBOTHAM  | , EDWARD ALA |  |  |
|   | Office Action Summary  | Examine  | er  | Art Unit  |              |  |  |
|   |  | Naoko S  |   | 3635  |              |  |  |
| Period fo                                     | The MAILING DATE of this commur<br>or Reply  | nication appears on th   | ne cover sheet with the c   | orrespondence ad  | ldress       |  |  |
| THE - Exte after - If the - If NC - Failu Any | ORTENED STATUTORY PERIOD F MAILING DATE OF THIS COMMUN nsions of time may be available under the provisions SIX (6) MONTHS from the mailing date of this com p period for reply specified above is less than thirty (3 period for reply is specified above, the maximum so the to reply within the set or extended period for reply reply received by the Office later than three months ed patent term adjustment. See 37 CFR 1.704(b). | ICATION. s of 37 CFR 1.136(a). In no e nunication. 30) days, a reply within the statutory period will apply and way will, by statute, cause the ap | vent, however, may a reply be tin<br>atutory minimum of thirty (30) day<br>will expire SIX (6) MONTHS from<br>oplication to become ABANDONE | nely filed s will be considered timel the mailing date of this o D (35 U.S.C. § 133). |              |  |  |
| Status  |  |  |   |   |              |  |  |
| 1)⊠   | Responsive to communication(s) file  | ed on 07 August 200  | 3.  |   |              |  |  |
| ·   |  |  |   |   |              |  |  |
| 3)□   | Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.  |  |   |   |              |  |  |
| Disposit                                      | ion of Claims  |  |   |   |              |  |  |
| 5)□<br>6)⊠<br>7)⊠                             | Claim(s) 1-10 is/are pending in the application.  4a) Of the above claim(s) is/are withdrawn from consideration.  Claim(s) is/are allowed.  Claim(s) 1-10 is/are rejected.  Claim(s) 1 is/are objected to.  Claim(s) are subject to restriction and/or election requirement.   |  |   |   |              |  |  |
| Applicat                                      | ion Papers   |  |   |   |              |  |  |
| • —   | The specification is objected to by the transfer of the drawing(s) filed on <u>07 August 2</u> 0   |  | epted or b)⊠ objected   | to by the Examine   | er.          |  |  |
|   | Applicant may not request that any objection Replacement drawing sheet(s) including  |  | •   | • •   | FR 1.121(d). |  |  |
| 11)[  | The oath or declaration is objected t  | o by the Examiner. N   | lote the attached Office  | Action or form P  | ΓΟ-152.      |  |  |
| Priority (                                    | under 35 U.S.C. § 119  |  |   |   |              |  |  |
| a)  | Acknowledgment is made of a claim  All b) Some * c) None of:  1. Certified copies of the priority  2. Certified copies of the priority  3. Copies of the certified copies  application from the Internation  | documents have be documents have be of the priority documents Bureau (PCT Ru   | en received.<br>en received in Applicati<br>nents have been receive<br>ule 17.2(a)).  | on No<br>ed in this National  | Stage        |  |  |
| Attachmen                                     |  |  | 4) 🔲 Intention: Surrey  | (DTO 442)   |              |  |  |
| 2) Notice 3) Information                      | ce of References Cited (PTO-892)<br>ce of Draftsperson's Patent Drawing Review (i<br>mation Disclosure Statement(s) (PTO-1449 o<br>er No(s)/Mail Date <u>August 7, 2003</u> .  |  | 4) Interview Summary Paper No(s)/Mail Do 5) Notice of Informal F 6) Other:  | ate   | O-152)       |  |  |

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#### **DETAILED ACTION**

#### Information Disclosure Statement

Applicant's Information Disclosure Statement has been entered; however, Applicant failed to provide copies of foreign references; therefore, these references have not been considered. Cited reference US Patent 5,619,826 is drawn to a bathroom assembly and appears to be cited in error; therefore, this reference has not been considered. The first entry on page 3 of the IDS, the Leafilter Product Literature, was not provided by Applicant; therefore, this reference has not been considered.

#### **Drawings**

Each page of the Drawings must be numbered in consecutive Arabic numerals starting with page 1, each numeral placed at the top, central location on the sheet, not in the margin.

In Figure 14, the extraneous marking between numerals 17 and 14 should be removed.

In Figure 18, extra numeral "9" at lower right should be removed.

The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the claimed features of claims 7-10 must be shown or the feature(s) canceled from the claim(s). No new matter should be entered. For example, regarding claim 7, the Drawings fail to illustrate that the mesh screen contacts the topmost surface of the expanded metal sheet such that the point of contact form a particular angle. Regarding claim 8, the Drawings fail to illustrate metal

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walls of diamond shaped openings extending downward and angled 30-40 degrees.

Regarding claim 10, the Drawings fail to illustrate metal walls angled downward and rearward.

A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

#### Specification

The disclosure is objected to because of the following informalities:

On page 3, 2<sup>nd</sup> paragraph, line 1, "6,146,020" should be - - 6,164,020 - -.

On page 5, 2<sup>nd</sup> paragraph, line 6, "Teaches" should be - - teaches - -.

On page 6, 2<sup>nd</sup> paragraph, line 1, "5,459,350" should be - - 5,459,965 - -.

On page 12, 2<sup>nd</sup> paragraph, line 11, "patenable" should be - - patentable - -.

On page 13, line 2, "I" should be - -It - -.

On page 24, line 3, "component t" should be - - component- - .

On page 29, "head 27" (line 11) and "dies 27" (line 18) use the same numeral for different structural parts.

On page 25, the specification omits numeral 16 as illustrated in Figure 13 and omits numeral 25b as illustrated in Figure 22.

On page 34, line 13, "Of" should be - - of - -.

The features of claims 7-10 have not been described in the specification.

Appropriate correction is required.

## Claim Objections

Claims 1 and 7-10 are objected to because of the following informalities:

In claim 1, line 2, "A" should be - - a - -.

Appropriate correction is required.

### Claim Rejections - 35 USC 112

The following is a quotation of the second paragraph of 35 USC 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 3-7 and 10 are rejected under 35 USC 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 3 recites the limitation "said front and rear longitudinal channels" in line 3.

There is insufficient antecedent basis for this limitation in the claim.

Claim 4 recites the limitation "said downwardly extending channel" in line 2. There is insufficient antecedent basis for this limitation in the claim. Similarly, claim 5, line 1, and claim 6, line 1, recite the same feature with insufficient antecedent basis.

Claim 7 recites the limitation "said angled metal walls" in line 2. There is insufficient antecedent basis for this limitation in the claim. Similarly, claim 10, line 2, recites the same feature with insufficient antecedent basis.

# Claim Rejections - 35 USC 103

The following is a quotation of 35 USC 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1 and 2 are rejected under 35 USC 103(a) as being unpatentable over US Patent 5,956,904 to Gentry in view of US Patent 6,134,843 to Tregear and article by Miami Aqua-culture Inc.

#### Claim 1:

Gentry discloses a gutter screen for a rain gutter comprising a fine mesh screen (22, Figure 1) comprising a lightweight aluminum fabric or any material which retains its shape (column 2, lines 39-42), an underlying skeletal structure of expanded metal (20, Figure 1) with generally diamond-shaped openings, and forward and rearward crimped portions (Figure 4).

While Gentry fails to disclose that the fine mesh screen has openings between threads no greater than 80 microns, such a size for polyester and nylon screening is well known in the art as disclosed by Miami Aqua-culture, Inc. (page 1, 2<sup>nd</sup> paragraph, line 1). As taught by Tregear, fine mesh polyester screens are used on gutters for allowing water to pass through while the openings of the screen are small enough to prevent trapping pine needles, a common problem with gutter screens (column 6, lines 25-35).

In view of Tregear and Miami Aqua-culture, Inc., it would have been obvious to one of ordinary skill in the art at the time the invention was made to use a fine mesh screen with

openings between thread no larger than 80 microns for permitting the passage of rainwater while avoiding the trapping of debris therein, the major concern of Gentry (column 1, lines 13-17).

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While Gentry's drawings do not illustrate forward and rear connectors crimped to the edges of the fine mesh screen and expanded metal, Gentry discloses that separate crimp sleeves could be used on the longitudinal edges (column 3, lines 50-54).

Claim 2:

Gentry's fine mesh screen and expanded metal screen are made integral to each other by crimping along front and rear longitudinal edges (Figure 3 and column 3, lines 50-52).

## Objection to Claims, Allowable Subject Matter

If corrected of their 112 issues explained above, claims 3-10 would be objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

# Prior Art Made of Record

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure: US Patent 297,382 to Golding and US Patent 1,562,191 to Reno

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disclose expanded metal with diamond-shaped openings. US Patent 5,010,696 to Knittel

and the Permaflow article disclose a gutter cover with spaced channels formed from solid

material, not a screen member. US Patent 2,209,741 to Sullivan et al. and US Patent

4,959,932 to Pfeifer disclose a gutter cover with edge connectors attached to the screen

edges.

**Contact Information** 

Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Naoko Slack whose telephone number is (703) 305-0315.

The examiner can normally be reached on Mon-Fri (6:00 am-2:30pm EST). If attempts to

reach the examiner by telephone are unsuccessful, the examiner's supervisor Carl D.

Friedman can be reached at (703) 308-0839. The fax phone numbers for the organization

where this application or proceeding is assigned are (703)872-9326 for regular

communications and (703) 872-9327 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or

proceeding should be directed to the receptionist whose telephone number is (703) 308-

1113.

NS

September 19, 2004

Naoko Slack

**Primary Examiner**